

PATENT ABSTRACTS OF JAPAN

(11)Publication number : 2004-254160

(43)Date of publication of application : 09.09.2004

(51)Int.Cl.

H03H 9/19

(21)Application number : 2003-043818

(71)Applicant : NIPPON DEMPA KOGYO CO LTD

(22)Date of filing : 21.02.2003

(72)Inventor : UMEKI SATOSHI

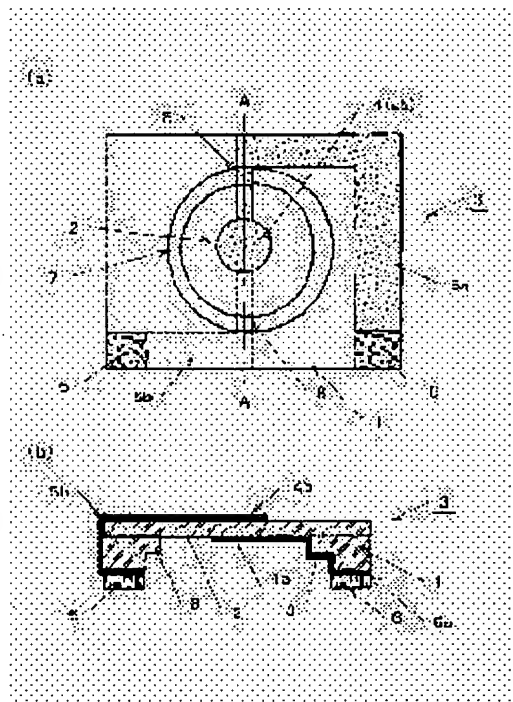
(54) CRYSTAL OSCILLATOR

(57)Abstract:

PROBLEM TO BE SOLVED: To provide a crystal oscillator of which the oscillation characteristics are maintained as satisfactory by suppressing distortion to be caused in an oscillating region.

SOLUTION: In the crystal oscillator having the oscillating region with thickness smaller than that of a peripheral part and having a crystal chip formed by extending an extraction electrode from excitation electrodes provided on both main surfaces of the oscillating region to the periphery part, it is constituted by providing a penetrating groove which separates both of the periphery part and the oscillating region except the connection part of both end parts in the boundary region of the periphery part and the oscillating region, extending the extraction

electrode from the excitation electrode to the periphery part to be both side of one end part of both end parts to be orthogonally crossed with both end parts via the connection part, and fixedly sticking both sides of one end to which the excitation electrode is extended, for example, with eutectic alloy to each other.



LEGAL STATUS

[Date of request for examination]

[Date of sending the examiner's decision of